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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/549,363	06/28/2006	Peter Gilbert Shotton	SHOTTON4	5522
	7590 04/16/200 D NEIMARK, P.L.L.C	EXAMINER		
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)			
Office Action Comments	10/549,363	SHOTTON ET AL.			
Office Action Summary	Examiner	Art Unit			
	TANIA C. COURSON	2841			
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence address			
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).					
Status					
1) Responsive to communication(s) filed on					
• • • • • • • • • • • • • • • • • • • •	-· action is non-final.				
<i>,</i> —					
closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
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Disposition of Claims					
 4) Claim(s) 1-18 is/are pending in the application. 4a) Of the above claim(s) 4,13,14 and 18 is/are withdrawn from consideration. 5) Claim(s) is/are allowed. 6) Claim(s) 1-3,5-12 and 15-17 is/are rejected. 7) Claim(s) is/are objected to. 8) Claim(s) are subject to restriction and/or election requirement. 					
Application Papers					
 9) ☐ The specification is objected to by the Examiner. 10) ☐ The drawing(s) filed on 14 September 2005 is/are: a) ☐ accepted or b) ☐ objected to by the Examiner. Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152. 					
Priority under 35 U.S.C. § 119					
 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. 					
Attachment(s) 1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 28JUN06. 4) Interview Summary (PTO-413) Paper No(s)/Mail Date 5) Notice of Informal Patent Application 6) Other:					

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DETAILED ACTION

Election/Restrictions

1. This application contains claims directed to the following patentably distinct species of

the claimed invention:

I. The species shown in Figure 1.

II. The species shown in Figures 2-3.

Applicant is required under 35 U.S.C. 121 to elect a single disclosed species for prosecution on the merits to which the claims shall be restricted if no generic claim is finally held to be allowable. Currently, claims 1 and 11 appear to be generic.

Applicant is advised that a reply to this requirement must include an identification of the species that is elected consonant with this requirement, and a listing of all claims readable thereon, including any claims subsequently added. An argument that a claim is allowable or that all claims are generic is considered nonresponsive unless accompanied by an election.

Upon the allowance of a generic claim, applicant will be entitled to consideration of claims to additional species which are written in dependent form or otherwise include all the limitations of an allowed generic claim as provided by 37 CFR 1.141. If claims are added after the election, applicant must indicate which are readable upon the elected species. MPEP § 809.02(a).

Should applicant traverse on the ground that the species are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the species to be obvious variants or clearly admit on the record that this is the case. In either instance, if the

examiner finds one of the inventions unpatentable over the prior art, the evidence or admission may be used in a rejection under 35 U.S.C. 103(a) of the other invention.

2. The species are independent or distinct because as disclosed the different species have mutually exclusive characteristics for each identified species. In addition, these species are not obvious variants of each other based on the current record.

There is an examination and search burden for these patentably distinct species due to their mutually exclusive characteristics. The species require a different field of search (e.g., searching different classes/subclasses or electronic resources, or employing different search queries); and/or the prior art applicable to one species would not likely be applicable to another species; and/or the species are likely to raise different non-prior art issues under 35 U.S.C. 101 and/or 35 U.S.C. 112, first paragraph.

- 3. During a telephone conversation with Mr. Sheridan Neimark on April 1, 2008, a provisional election was made with traverse to prosecute the invention of Group II (Figs. 2-3), claims 1-3, 5-12 and 15-17. Affirmation of this election must be made by applicant in replying to this Office action. Claims 4, 13-14 and 18 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.
- Applicant is reminded that upon the cancellation of claims to a non-elected invention, the 4. inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the

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application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

Drawings

5. The drawings are objected to because the drawings of the following:

- a) Figure 3 are not labeled separately in accordance 37 CFR 1..84(u);
- b) Additional information (i.e. WO 2004/081294 & PCt/GB2004/000948) should not appear in the Figures.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

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Specification

6. The disclosure is objected to because of the following informalities:

a) on page 8, line 8, change "EP 0302717" to "EP 0302707".

Appropriate correction is required.

Claim Objections

- 7. Claims 3, 7, 12 and 16 are objected to because of the following informalities:
 - a) claim 3, in line 5, "elecrolevel" should read "electrolevel";
 - b) claim 7, in line 3, "a single" should read "the single";
 - c) claim 12, in line 6, "t the level" should read "to the level", and;
 - d) claim 16, in line 3, "a single" should read "the single".

Appropriate correction is required.

Claim Rejections - 35 USC § 112

8. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

9. Claim 8 is rejected under 35 U.S.C. 112, second paragraph, as being incomplete for omitting essential structural cooperative relationships of elements, such omission amounting to a gap between the necessary structural connections. See MPEP § 2172.01. It is not clear to what the "two rigid or taut connections" are connected to or where they are located.

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Claim Rejections - 35 USC § 102

10. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the

basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on

sale in this country, more than one year prior to the date of application for patent in the United States.

11. Claims 1-2 and 9-10 are rejected under 35 U.S.C. 102(b) as being anticipated by Shotton

(EPO 0302707).

Shotton, disclose in Figures 1-8, a method and equipment for accurately positioning items

in shafts or piles comprising:

With respect to claims 1-2 and 9-10:

a) an upper positioning means (7 & 8) and a lower positioning means (9 & 10)

for adjusting the plan position of the element within the interior space at upper

and lower levels (Fig. 4); respectively, the apparatus being provided with a

means to measure the difference in alignment between the first plan position

of the element and the second plan position of the element (column 4, lines 45

thru 59);

b) wherein the means to measure the difference in alignment between the first

plan position of the element and the second plan position of the element

extends between the upper and lower positioning means (column 4, lines 45

thru 59);

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c) wherein the upper and lower positioning means each comprise a guide means (12-14) for adjusting the plan position of an element within the interior space (Fig. 7);

d) wherein the guide means comprises a first and a second pair of rollers (12-14) which are moveable in mutually orthogonal directions across the interior space (Fig. 7).

With respect to the preamble of the claim \(\frac{1}{2}\): the preamble of the claim has not been given any patentable weight because it has been held that a preamble is denied the effect of a limitation where the claim is drawn to a structure and the portion of the claim following the preamble is a self – contained description of the structure not depending for completeness upon the introductory clause. *Kropa v. Robie*, 88 USPQ 478 (CCPA 1951).

Claim Rejections - 35 USC § 103

- 12. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 13. Claims 3 and 5-8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Shotton '707 in view of Smetanin et al. (US 3,544,957).

Shotton '707 disclose method and equipment for accurately positioning items in shafts or piles, as stated above in paragraph 11.

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Shotton '707 further discloses the following:

a) wherein the means to measure the difference in alignment between the first

plan position of the element and the second plan position of the element,

comprises at least one rigid or taut connection (6);

b) wherein the rigid or taut connection comprises a bar or tube (6);

c) wherein two rigid or taut connections are provided (Fig. 4).

Shotton '707 does not disclose the following:

a) wherein means to measure a difference in alignment comprises one or more

elecrolevel.

Smetanin et al. teaches an electronic inclinometer for electric drills that consists of

wherein means to measure a difference in alignment comprises one or more electrolevel (8, 8',

8"). Therefore, it would have been obvious to one having ordinary skill in the art at the time the

invention was made to further modify the method and equipment for accurately positioning items

in shafts or piles of Shotton '707, so as to replace Shotton's means to measure the difference in

alignment with the one or more electrolevel, as taught by Smetanin et al., in order to enhance the

accuracy capabilities of the alignment means.

14. Claims 11-12, and 15-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over

Shotton '707 in view of Smetanin et al.

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Shotton '707 discloses an equipment for accurately positioning items in shafts or piles including the following;

- a) A method of positioning an element in a borehole (Fig. 4), the method comprising the steps of: i) placing into the borehole an apparatus comprising an upper positioning means (7 & 8) and a lower positioning means (9 & 10) for adjusting the plan position of the element within the interior space at upper and lower levels respectively (Fig. 4), the apparatus being provided with a means to measure the difference in alignment between the first plan position of the element and the second plan position of the element (column 4, lines 45 thru 59) ii) lowering the element into an interior space defined by the apparatus to a required depth within the borehole (Fig. 4); and iii) measuring the difference in alignment between the first plan position of the element and the second plan position of the element by means of the or each gauge (column 4, lines 45 thru 59); and iv) adjusting the upper and lower positioning means to achieve the desired alignment between the first and second plan positions of the element (Fig. 4);
- b) wherein the means to measure the difference in alignment between the first plan position and the second plan position comprises the use of: i) at least one rigid or taut connection extending between the first point at the level of the first plan t the level of the first plan position and a second point at the level of the second plan position (6), the first and second points being at an identical displacement from the element (Fig. 4); ii) one or more gauges provided on the or each rigid or taut connection, so as to measure the inclination of the rigid or taut connection (column 4, lines 45 thru 59);

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c) wherein two gauges are provided which are arranged so as to measure the inclination
of the rigid or taut connection in mutually orthogonal directions (column 4, lines 45
thru 59);

- d) wherein both of the gauges are provided on a single rigid or taut connection (column 4, lines 45 thru 59);
- e) wherein two rigid or taut connections are provided (6).

Shotton '707 does not disclose wherein a gauge is an electrolevel gauge.

Smetanin et al. teaches an electronic inclinometer for electric drills that consists of wherein a gauge is an electrolevel gauge (8, 8', 8''). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to further modify the method and equipment for accurately positioning items in shafts or piles of Shotton '707, so as to replace Shotton's gauge with the electrolevel, as taught by Smetanin et al., in order to enhance the accuracy capabilities of the alignment means.

Double Patenting

15. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined

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application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

16. A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

17. Claims 1-2 and 9-11 of Application No. 10/549363 are provisionally rejected on the ground of nonstatutory double patenting over claims 1-4 and 9 of copending Application No. 10/549362 in view of Application No. 10/549362 's specification. This is a provisional double patenting rejection since the conflicting claims have not yet been patented.

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Furthermore, there is no apparent reason why applicant would be prevented from presenting claims corresponding to those of the instant application in the other copending application. See *In re Schneller*, 397 F.2d 350, 158 USPQ 210 (CCPA 1968). See also MPEP § 804.

The subject matter claimed in the instant application is fully disclosed in the referenced copending application and would be covered by any patent granted on that copending application since the referenced copending application and the instant application are claiming common subject matter, as follows:

Claims 1-2 and 9-11 of Shotton et al. '363 claim a method and apparatus for monitoring element alignment, comprising the following:

- a) an upper positioning means (2) and a lower positioning means (3) for adjusting the plan position of the element within the interior space at upper and lower levels (Fig. 1); respectively, the apparatus being provided with a means to measure the difference in alignment between the first plan position of the element and the second plan position of the element (paragraph 35);
- b) wherein the means to measure the difference in alignment between the first plan position of the element and the second plan position of the element extends between the upper and lower positioning means (Fig. 1);
- c) wherein the upper and lower positioning means each comprise a guide means (7-10) for adjusting the plan position of an element within the interior space (Fig. 1);

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d) wherein the guide means comprises a first and a second pair of rollers (7-10) which are moveable in mutually orthogonal directions across the interior space (Fig. 1);

e) A method of positioning an element in a borehole (Fig. 1), the method comprising the steps of: i) placing into the borehole an apparatus comprising an upper positioning means (2) and a lower positioning means (3) for adjusting the plan position of the element within the interior space at upper and lower levels respectively (Fig. 1), the apparatus being provided with a means to measure the difference in alignment between the first plan position of the element and the second plan position of the element (paragraph 35) ii) lowering the element into an interior space defined by the apparatus to a required depth within the borehole (Fig. 1); and iii) measuring the difference in alignment between the first plan position of the element and the second plan position of the element by means of the or each electrolevel gauge (paragraph 35); and iv) adjusting the upper and lower positioning means to achieve the desired alignment between the first and second plan positions of the element (Fig. 1).

Conclusion

18. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

The prior art cited on PTO-892 and not mentioned above disclose measurement tools:

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Hulsing, II (US 4,459,759)

Lapeyre (US 4,130,942)

Crow (US 4,022,284)

Jones (US 3,693,142)

Waters (US 3,077,670)

19. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tania C. Courson whose telephone number is (571) 272-2239. The examiner can normally be reached on Monday-Friday from 8AM to 4:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dean Reichard, can be reached on (571) 272-1984.

The fax number for this Organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published applications

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

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applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/G. Bradley Bennett/

Primary Examiner, Art Unit 2841

TCC

April 12, 2008